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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/466,405	12/17/1999	FARRELL L. OSTLER	PHA23.891	1131
24737	7590 05/19/2003	• • • • • • • • • • • • • • • • • • • •		
	ECTRONICS NORTH A	EXAMINER		
580 WHITE PLAINS RD TARRYTOWN, NY 10591		***	MEONSKE, TONIA L	
		•	ART UNIT	PAPER NUMBER
			2183	n
			DATE MAILED: 05/19/2003	·
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Please find below and/or attached an Office communication concerning this application or proceeding.

		Application No.	Applicant(s)	a				
Office Action Summary		09/466,405	OSTLER ET AL					
		Examiner	Art Unit					
		Tonia L Meonske	2183					
The MAILING DATE of this communication appears on the cover sheet with the correspond nce address Period for Reply								
THE - External after of the control	HORTENED STATUTORY PERIOD FOR REPL MAILING DATE OF THIS COMMUNICATION. ensions of time may be available under the provisions of 37 CFR 1. r SIX (6) MONTHS from the mailing date of this communication. e period for reply specified above is less than thirty (30) days, a rep of period for reply is specified above, the maximum statutory period ure to reply within the set or extended period for reply will, by statut reply received by the Office later than three months after the mailing patent term adjustment. See 37 CFR 1.704(b).	.136(a). In no event, however oly within the statutory minim will apply and will expire SI te, cause the application to b	er, may a reply be timely filed um of thirty (30) days will be considered tim K (6) MONTHS from the mailing date of this ecome ABANDONED (35 U.S.C. § 133).					
1)⊠	Responsive to communication(s) filed on 24	April 2003 .						
2a)⊠	This action is FINAL . 2b) ☐ T	his action is non-fina	al.					
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.								
·	tion of Claims							
4)[Claim(s) 1-9 is/are pending in the application.							
5\□	4a) Of the above claim(s) is/are withdrawn from consideration.							
·	5) Claim(s) is/are allowed.							
7)	6) Claim(s) 1-9 is/are rejected. 7) Claim(s) is/are objected to.							
′=	Claim(s) are subject to restriction and/o	or election requirem	ent.					
•	ion Papers							
9)	The specification is objected to by the Examine	er.						
10)⊠ The drawing(s) filed on <u>17 December 1999</u> is/are: a)□ accepted or b)⊠ objected to by the Examiner.								
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).								
11)☐ The proposed drawing correction filed on is: a)☐ approved b)☐ disapproved by the Examiner.								
If approved, corrected drawings are required in reply to this Office action.								
12)☐ The oath or declaration is objected to by the Examiner.								
Priority under 35 U.S.C. §§ 119 and 120								
13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).								
a) ☐ All b) ☐ Some * c) ☐ None of:								
	1. Certified copies of the priority documents have been received.							
	2. Certified copies of the priority documents have been received in Application No							
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. 								
· <u> </u>	14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).							
a) The translation of the foreign language provisional application has been received. 15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.								
Attachmer	•							
2) 🔲 Notic	ce of References Cited (PTO-892) ce of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO-1449) Paper No(s)	5) 🔲 N	nterview Summary (PTO-413) Paper N lotice of Informal Patent Application (P ther:					

DETAILED ACTION

Drawings

- 1. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore the default register must be shown in the drawings or the feature cancelled from the claims. Furthermore, the method claims must be shown in the drawings, for example in a flow chart, or the feature(s) canceled from the claim(s). No new matter should be entered.
- 2. A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

Claim Rejections - 35 USC § 112

- 3. The following is a quotation of the first paragraph of 35 U.S.C. 112:
 - The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.
- 4. Claims 1-9 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention. The limitation in claim 1, "A first instruction that is configured to cause the processor to *concurrently* load a specified address into the default register to form the default destination address <u>and execute program</u> instructions that are located in the memory at the default-destination address contained in the default register" is not enabled by the specification. Instead, the specification discloses a default

register, a first instruction to load a specified address into the default register, and a second instruction to execute program instructions that are located in the memory at the default-destination address contained in the default register. The specification does not disclose that the second instruction is concurrently executed with the first instruction as claimed in claim 1. Therefore, for purposes of examination, the limitation "A first instruction that is configured to cause the processor to *concurrently* load a specified address into the default register to form the default destination address and execute program instructions that are located in the memory at the default-destination address contained in the default register" is interpreted as being a first instruction to load a specified address into the default register, and a second instruction, which is not concurrently executed with the first instruction, to execute program instructions that are located in the memory at the default-destination address contained in the default register.

- 5. Independent claims 6 and 7 contain the same defects of independent claim 1 and are therefore rejected for the same reasons of claim 1.
- 6. Claim 2-5, 8, and 9 are rejected for incorporated the defects of their depending claims 1, 6, and 7.

Claim Rejections - 35 USC § 102

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 8. Claims 1-9 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Davidson et al., cited by Applicant in the Information Disclosure Statement filed on August 2, 2001.

9. Referring to claim 1, Davidson et al have taught a processor that is configured to execute program instructions that are stored in a memory, said processor comprising:

- a. a default-register that is configured to contain a default-destination address (abstract, page 183, section 3, "The branch Register Approach", page 184, see "Conditional Branches", and see b[7] in the example code.); and
- b. wherein the program instructions include:
 - i. a first instruction that is configured to cause the processor to concurrently load a specified address into the default-register to form the default-destination-address and execute program instructions that are located in the memory at the default destination-address contained in the default-register (page 184, "Conditional Branches", $b[7] = r[5] < 0 -> b[2] \mid b[0]$; is the first instruction which loads an address into the default register b[7]. This first instruction later causes the processor to execute program instructions at the default destination address contained in the default-register when the value of b[7] is loaded into b[0].), and
 - ii. a second instruction that is configured to cause the processor to subsequently execute the program instructions that are located in the memory at the default-destination-address contained in the default-register (pages 184, "Conditional Branches", b[0] = b[7]; is the second instruction that is executing instructions located in memory at the default-destination-address contained in the default-register, b[7].).

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10. Referring to claim 2, Davidson et al. have taught the processor of claim 1, as described above, and wherein the second instruction includes a condition test and is further configured to cause the processor to execute program instructions that are located at the default-destination-address in dependence upon a result of the condition test (pages 184, "Conditional Branches", When executing the second instruction, or b[0] = b[7], the value loaded into b[0] is dependent on the condition test value b[7].)

- Referring to claim 3, Davidson et al. have taught the processor of claim 1, as described above, and wherein the default-register is further configured to
 - a. contain a default condition-test (pages 184, "Conditional Branches", When executing the second instruction, or b[0] = b[7]; , the value loaded into b[0] is dependent on a default condition test value b[7], which was derived in another instruction, or b[7] = r[5] < 0 -> b[2] | b[0];.); and
 - b. wherein the second instruction is further configured to cause the processor to execute program instructions that are located at the default-destination-address in dependence upon a result of the default-condition-test contained in the default-register (pages 184, "Conditional Branches", When executing the second instruction, or b[0] = b[7]; , the value loaded into b[0] is dependent on a default condition test b[7].).
- 12. Referring to claim 4, Davidson et al. have taught the processor of claim 1, as described above, and wherein the second instruction is further configured to cause the processor to execute program instructions that are located at the default-destination-address in dependence upon a result of a prior condition-test (pages 184, "Conditional Branches", When executing the second

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instruction, or b[0] = b[7]; , the value loaded into b[0] is dependent on the result in b[7] derived in a prior condition-test, or in $b[7] = r[5] < 0 \implies b[2] \mid b[0]$;).

- 13. Referring to claim 5, Davidson et al. have taught the processor of claim 1, as described above, and wherein
 - a. the default-register is further configured to contain a default condition-test (page 184, see "Conditional Branches", in the example code, b[7] = r[5] < 0 -> b[2] | b[0]; the branch register b[7] is set based on the value of r[5]. b[7] is the result of the test, or the default condition-test.); and
 - b. wherein the program instructions further include:
 - i. a third instruction that is configured to cause the processor to execute program instructions that are located at another specified address in dependence upon a result of the default-condition-test contained in the default-register (page 184, see "Conditional Branches", in the example code the branch register is set based on the value of r[5]. Based on the value of r[5], b[2] or b[0], which is another specified address, is loaded into b[7].).
- 14. Referring to claim 6, Davidson et al. have taught a processor that is configured to execute program instructions that are stored in a memory (Figure 1, Instructions are fetched from the cache memory.), said processor comprising:
 - a. a default-register that is configured to contain a default-condition-test (abstract, page 183, section 3, "The branch Register Approach", page 184, see "Conditional Branches", and see b[7] in the example code.); and
 - b. wherein the program instructions include:

- i. a first instruction that is configured to cause the processor to concurrently load a specified condition into the default-register to form the default-condition-test and execute program instructions that are located in the memory at a destination-address based on a result of the default-condition-test (page 184, "Conditional Branches", $b[7] = r[5] < 0 -> b[2] \mid b[0]$; is the first instruction which loads an address into the default register b[7]. This first instruction later causes the processor to execute program instructions at the default destination address contained in the default-register when the value of b[7] is loaded into b[0].), and
- ii. a second instruction that is configured to cause the processor to subsequently execute program instructions that are located in the memory at a destination-address based on a result of the default-condition-test (pages 184, "Conditional Branches", When executing the second instruction, or b[0] = b[7]; , the value loaded into b[0] is based on a result of a condition test, or b[7] = r[5] < 0 -> $b[2] \mid b[0]$;.).
- 15. Referring to claim 7, Davidson et al. have taught a method of controlling a sequence of program instructions, said method comprising:
 - a. executing a first instruction that concurrently specifies a destination address and conditionally causes the default-destination address to become a next instruction address during, a first processing cycle (page 184, "Conditional Branches", b[7] = r[5] < 0 -> $b[2] \mid b[0]$; is the first instruction which loads an address into the default register b[7]. This first instruction later causes the processor to execute program instructions at the

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default destination address contained in the default-register when the value of b[7] is loaded into b[0].);

- b. subsequent to an execution of the first instruction, executing a second instruction that causes the default-destination-address to become the next instruction address during a second processing cycle (pages 184, "Conditional Branches", b[0] = b[7]; is the second instruction that causes the default-destination-address to become the next instruction address during a second processing cycle.); and
- c. subsequent to an execution of the second instruction, executing a third instruction that is located at the next instruction address (pages 184, "Conditional Branches", L2: ... , The instruction located at L2, or the next instruction address, is the 3rd instruction executed.).
- 16. Referring to claim 8, Davidson et al. have taught the method of claim 7, as described above, and further comprising:
 - a. executing a fourth instruction, before executing the second instruction, that specifies a condition-test (page 184, "Conditional Branches", b[7] = r[5] < 0 -> b[2] | b[0]; is the fourth instruction which is executed before the second instruction, b[0] = b[7];. The value of r[5] is the condition being tested and b[7] contains the result or condition test.); and
 - b. wherein causing the default-destination-address to become the next instruction address during the second processing cycle is dependent upon a result of the condition-test when the second instruction is executed (page 184, "Conditional Branches", When executing the second instruction, or b[0] = b[7]; , the value loaded into

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b[0] is dependent on the condition test in the fourth instruction, or b[7] = r[5] < 0 -> b[2] | b[0];.).

- 17. Referring to claim 9, Davidson et al. have taught the method of claim 7, as described above, and further comprising:
 - a. saving a result of a condition-test, before executing the second instruction (page 184, "Conditional Branches", b[7] = r[5] < 0 -> b[2] | b[0]; The result of the condition test is saved in b[7] before executing the second instruction, b[0] = b[7].); and
 - b. wherein causing the default-destination-address to become the next instruction address during the second processing cycle when executing the second instruction is dependent upon the result of the condition-test (page 184, "Conditional Branches", When executing the second instruction, or b[0] = b[7]; , the value loaded into b[0] is dependent on the result of a condition test, or $b[7] = r[5] < 0 \rightarrow b[2] | b[0]$;.).

Response to Arguments

18. Applicant's arguments with respect to claims 1-9 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

- 19. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).
- 20. A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after

the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

- Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tonia L Meonske whose telephone number is (703) 305-3993.

 The examiner can normally be reached on Monday-Friday, 9-6:30, with every other Friday off.
- 22. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Eddie P Chan can be reached on (703) 305-9712. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 746-7239 for regular communications and (703) 746-7238 for After Final communications.
- 23. Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 305-3900.

tlm

May 12, 2003

RICHARD L. ELLIS RICHARD L. ELLIS RIMARY EXAMINER